

WHAT IS CLAIMED IS:

- 1        1. An antenna, comprising:  
2              a converger, including a conductor which converges a magnetic flux  
3              of an electromagnetic wave; and  
4              a converter, which converts the converged magnetic flux into voltage.
- 1        2. The antenna as set forth in claim 1, wherein:  
2              a through hole into which the magnetic flux is converged is formed at  
3              a center portion of the conductor; and  
4              a cutout is formed so as to extend from a part of the through hole to  
5              an outer periphery of the conductor.
- 1        3. The antenna as set forth in claim 2, wherein the converger includes a  
2              resistance reducer provided on at least a peripheral portion of the conductor to  
3              reduce resistance against current flowing in the conductor.
- 1        4. The antenna as set forth in claim 2, wherein the conductor plate is  
2              composed of a plurality of sub-plates.
- 1        5. The antenna as set forth in claim 1, wherein the converter is provided  
2              as a coil.
- 1        6. The antenna as set forth in claim 1, wherein the converter has a size  
2              which is sufficiently smaller than a wavelength of the electromagnetic wave.

1       7.       The antenna as set forth in claim 5, wherein a winding number of the  
2 coil is two or more.

1       8.       The antenna as set forth in claim 1, wherein the converter is formed  
2 on a semiconductor integrated circuit.

1       9.       An antenna for communicating an electromagnetic wave, comprising:  
2              a first converger, which converges the electromagnetic wave;  
3              a second converger, which faces the first converger and includes a  
4              conductor plate having a through hole, into which a magnetic flux of the  
5              converged electromagnetic wave is converged, formed at a center portion  
6              thereof so as to have a size which is sufficiently smaller than a wavelength of  
7              the electromagnetic wave, and a cutout extending from a part of the through  
8              hole to an outer periphery of the conductor plate; and  
9              a converter, which faces the through hole of the conductor plate to  
10          convert the converged magnetic flux into voltage.

1       10.      The antenna as set forth in claim 9, wherein the second converger  
2              includes an upright conductor formed along an outer peripheral portion of the  
3              conductor plate, the through hole and the cutout, so as to extend in an  
4              orthogonal direction of a direction in which the conductor plate extends.

1       11.     The antenna as set forth in claim 9, wherein the first converger  
2 includes a conductor plate having a slot formed at a center portion thereof and  
3 an upright conductor formed along an outer periphery of the conductor plate so  
4 as to extend in an orthogonal direction of a direction in which the conductor  
5 plate extends.

1       12.     The antenna as set forth in claim 11, wherein each of the slot of the  
2 first converger and the outer periphery of the conductor plate of the second  
3 converger has a linear portion whose dimension is substantially a half of a  
4 wavelength of the electromagnetic wave.

1       13.     The antenna as set forth in claim 9, wherein the converter is provided  
2 as a coil.

1       14.     An antenna, comprising:  
2                 a plurality of antenna elements, interconnected with each other, each  
3         antenna element including:  
4                         a converger, including a conductor which converges a  
5         magnetic flux of an electromagnetic wave; and  
6                         a converter, which converts the converged magnetic flux into  
7         voltage.

1       15.     The antenna as set forth in claim 14, wherein the antenna elements  
2 are interconnected such that voltages outputted from the respective converters  
3 are added.